

**U.S. ENVIRONMENTAL PROTECTION AGENCY
FINAL POLREP**

DATE: July 1, 2004

FROM: Steve Spurlin
On-Scene Coordinator
ERRB-Region 4

TO: RRC Region 4
Shane Hitchcock, Branch Chief
Don Rigger, Section Chief
TDEC

I. GENERAL SITE INFORMATION

Site ID#	A4T3
Site Name:	College Grove Battery Chip
Street Address:	Various Properties in Rutherford & Williamson Cos., TN
City, County, State:	College Grove, Williamson Co., Tennessee
Response Authority:	CERCLA
NPL Status:	Non-NPL
Incident Category:	Removal Action
Completion Date:	January 14, 2004
EPA OSC:	Steve Spurlin

II. BACKGROUND INFORMATION

The U. S. Environmental Protection Agency (EPA) has been involved with this site periodically since September 1999. The Tennessee Department of Environment & Conservation (TDEC) requested assistance in 1999 when it was discovered that there had been wide spread use of lead acid battery chips as fill material around the College Grove, Rutherford County, Tennessee area. EPA, with the assistance of the START contractor, originally conducting sampling investigations at 20 residential, agricultural, and commercial properties from September through November of 1999. An additional 98 properties were discovered and assessed from January through February 2002. Of the 118 properties initially assessed, 96 had lead concentrations exceeding safe levels, prompting the OSC assigned at that time, Rick Jardine, to develop and submit an Action Memorandum requesting the 12 month/\$2 million statutory exemption for a removal action. Since the ceiling request exceeded \$6 million, the action memo was sent to EPA Headquarters for approval. Headquarters approval was obtained June 15, 2000, and signed-off at the Region on June 26, 2000. The approved project ceiling for the action memo was \$10,282,000. All work for this Site has been conducted pursuant to this original action memo.

A removal action was conducted at these original 96 properties in Rutherford and Williamson

Counties from May 2000 until February 2002. A report documenting the actions for the 96 properties was completed in July 2002.

In August 2002, TDEC contacted EPA about additional properties. Six additional properties were assessed from September through December 2002. A removal was conducted at 5 of the 6 properties from October 2002 until February 2003. A report documenting the actions for the 5 properties was completed in June 2003.

In October 2003, TDEC contacted EPA about an additional property (Smith property) where battery chips were reported. The property was assessed in October 2003, and a removal conducted from November 2003 until December 2003. A report summarizing the action was completed in February 2004.

III. RESPONSE INFORMATION

A. Actions Taken:

October 2002

CMC viewed two properties during the month. Samples from these properties were taken by START and submitted for analysis to determine waste characterization. Transportation and disposal sub-contracts were solicited for bids and awarded. Materials for restoration activities were located and set up.

November

Mobilization took place on November 11th. CMC, EPA, and START looked at 4 properties that were to have remediation. One property, Crockett Springs Farm, had two locations. Scales Trucking was selected for landfill hauling and topsoil delivery. START provided marking of contaminated areas and determining clean with a Niton instrument. The Glenn property was started and completed on November 12th. Equipment was moved to the Tomlin property which had a long drive and area around a barn that required removal. Rock was used for backfill on the Tomlin property. Work was completed at the Tomlin property on November 20th. Equipment was moved to the Crockett Springs Farm where an area around a sawmill and over a septic system at a house were addressed. The Crockett Springs Farm property was completed on November 22nd.

Equipment was moved to the Osbourn property and work started on November 22nd. Work was not completed at the Osbourn property when the Thanksgiving break started on the 27th.

A total of an estimated 1,440 tons was disposed of at the Waste Management's Subtitle D landfill at Lewisburg, TN during November.

December

Work continued at the Osbourn property with disposal of contaminated soil and backfilling. Disposal was completed at the Osbourn property on December 3rd. Total disposal for the month was 291.64 tons for a total to date 1,732.17 tons. Restoration would continue when the area

dried. Equipment was moved to the White property located at 200 Mallory Station Road, Franklin, TN on December 4th. Excavation and stockpiling started and continued throughout the month. START took samples of the stockpiles, and all results indicated TCLP Lead greater than 5 ppm. Therefore, the stockpiles were consolidated and moved to an area suitable for transfer to the mixing cell. Pricing was obtained for hazardous waste disposal and an estimate was prepared for mixing with Triple Super Phosphate (TSP) and disposal as non-hazardous. The decision was to mix the contaminated soil with TSP, but the mixing would be in prepared cells by use of a rototiller pulled by a tractor. Mixing started on December 16th. The Rutherford Coop was the low bidder for supplying TSP. CMC could obtain the material on an as needed basis. START took samples every day of the mixed material to verify the accomplishment. Every batch of mixed soil had a TCLP Lead analysis of non-detect.

Excavation at the White property became extensive with approximately 2 ½ acres disturbed. START provided confirmatory sampling with the XRF instrument as excavation was being done. An estimate of 2,000 tons of soil to be treated was used to estimate costs so an increase of the ceiling could be obtained. On December 10th, an increase of \$200,000 was obtained. A temporary road made with swamp mats was put in for truck traffic.

January 2003

Treatment of soil continued until January 4th. All samples of treated soil indicated that treatment was effective in making the soil non-hazardous. Disposal of soil from the White property started on January 2nd and continued throughout the month. During the month 3,243.35 tons of soil from the White property was disposed of. As the load out stockpile became smaller, START took confirmatory analysis with the XRF to confirm concentration of residual material. The area east of the asphalt driveway was excavated on January 22nd and backfill was completed on the 23rd. The area west of the asphalt driveway was excavated on the 27th and backfill was completed on the 28th. Backfilling of the area east of the barn started on the 28th with the use of an off-road dump truck to transport the backfill to the area. Backfilling continued through the rest of the month.

Restoration at the Osbourn property was completed on January 11th with addition of more topsoil, grading, adding rock for a drive to the storage shed, seeding, and strawing.

An additional \$150,000 was added to the ceiling because of the amount of material removed from the White property. A job total of 4,975.52 tons of contaminated soil has been disposed of to date.

February

An additional \$75,000 was added to the ceiling to complete the work. Backfilling of the White property continued until February 3rd when wet weather prevented additional backfill being delivered to the site. CMC demobilized from the site on February 4th to wait until additional backfill can be delivered. The remaining amount of contaminated material was disposed of on February 4th with a total of 107.55 tons being disposed of during the month. There was a total of 3,350.9 tons disposed of from the White property and a job total of 5,083.07 tons.

March

CMC remobilized to the site on March 10th to complete backfilling the White property. The last of the backfill topsoil was delivered on March 17th. A rough grade was put on the backfilled area. Bids were received from vendors capable of putting a finish grade on the property and then hydroseeding the area. A Purchase Order was issued to McFall Sod and Seed, Columbia, TN to do the finish grade and hydroseeding once the soil dried some.

The swamp pad road was removed and shipped back to CMC. All materials and equipment were removed from the White property by March 21st.

William Oglesby's property at 2437 S. Hwy 41A, Eagleville required some repair of the drive due to washing. This property was remediated during a Delivery Order issued under the ERRS Contract No. 68-S7-4006. Mr. Spurlin approved the repair, which required adding more rock to the drive and grading the affected part of the drive. Not all of the drive was worked on during work on March 20th.

CMC demobilized from the site on March 21st.

April

A final grade was put on the White property during April 2nd by McFall Sod and Seed that also hydroseeded the property on April 3rd. Mr. Bartlett visited the site on April 29th to inspect the grass growth and view the erosion that had occurred. April had been a very wet month. Erosion damage will need to be repaired. The seeding will need to be watched for possible reseeding in some areas.

May

May continued to be a very wet month. Scheduling could not be worked out for erosion repair and reseeding with McFall Sod.

June

A Purchase Order was issued to Commercial Hydroseed for repair of the erosion areas, tilling some bare areas for reseeding, and spreading seed and straw over approximately one acre of the White property in Franklin, TN. This work was done on June 6th. It started raining as the work was finishing, so the Project Manager observed where the water flow was coming from that was causing the erosion. The gutter on the barn was leaking and overflowing causing rainwater to flow over the seeded areas. The OSC wanted CMC to patch the gutter and put up a water diversion before spreading more seed.

The gutter repair and cleaning the gutters and down spout and putting sand bags along the edge of the concrete pad for water diversion were done on June 24th. The erosion areas were raked, seeded, and strawed on June 25th. Grass was well underway in getting established on most of the White property.

There was no site activity in July through August at the site.

September

The PM went by Mrs. White's property, Franklin, on September 21st to observe the growth of the grass. It would require minor reseeded only in spots. The drainage diversion was effective in preventing erosion.

October

The Period of Performance was extended to July 1, 2004. An additional property was made known, and START took soil samples on October 30th. Cedar Ridge Landfill was contacted about pricing, and there has been a \$0.03 per ton tax increase since the last disposal.

November

An increase in the ceiling of \$35,000 was received in November for the continuation of the remediation. The soil samples from the additional property indicated that the material required remediation and treatment before disposal. The additional property is owned by the Smith's and is located at 4248 Pate Road, Franklin, TN. There was a site visit by Mr. Corman, Ray Savage, the substitute Project Manager, and the EPA OSC on November 12th to review the scope of work for the site.

CMC mobilized to the Smith property on November 16th. Triple Super Phosphate, the reagent for reducing the leachable lead, was hauled to the site. Excavation of the site started on the 17th with the driveway and extended to an area near the garage and into the backyard. START used a NITON to assist in the excavation. The soil was stockpiled. Mixing the TSP with the contaminated soil was done with the mini-excavator that was on-site. Backfilling with crusher run and soil started on the 21st. Disposal of the treated material took place on the 25th and 26th with the disposal of 146.67 tons.

The sand bags used for drainage diversion at the White property were removed on the 20th and consolidated with the material from the Smith property for disposal.

No activity occurred in December.

January 2004

On January 13-14, 2004, CMC completed the backfill and restoration of the Smith property

February

Prices were solicited for aerating, overseeding, fertilizing, and weed spraying of approximately 2.5 acres of the White property. A purchase order was given to Turf Way Lawn Care

March

The overseeding and fertilizing of the White property took place on March 4th by Turf Way Lawn Care.

April

No activity occurred during the month.

May

The seeded area of Mrs. White's property was sprayed for weeds on May 19th. This completes the work at this site.

B. Future Actions: No future actions are planned. No post-removal site controls needed.

IV. COST INFORMATION**

The following direct costs are associated with the property cleanups conducted during the time period October 2002 to February 2003.

ERRS	\$641,568
START	\$ 51,000
EPA	\$ 6,400

**The above accounting of expenditures is an estimate based on figures known to the OSC at the time this report was written. The cost accounting provided on this report does not represent an exact monetary figure which the government may include in any claim for cost recovery.

V. ROSTER OF AGENCIES/ORGANIZATIONS ASSISTING IN REMOVAL

<u>ORG/AGENCY</u>	<u>CONTACT</u>	<u>PHONE</u>
US EPA	Steve Spurlin	731/422-0101
TDEC-EAC/Nashville	Pam Franklin	888/891-8332
START	Ron Grover/ Alan Brown	615/254-4559
CMC, Inc.	Raymond Savage	888/854-3732